



One Cambridge Place 50 Hampshire Street
Cambridge Massachusetts 02139
Tel: 617 452 0000
Fax: 617 452 8000

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JOHN MULLFELD

SDMS Document ID



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April 5, 2002

Mr John McGuggin, P E
US Department of Transportation
Volpe National Transportation Systems Center
55 Broadway, DTS-33
Kendall Square
Cambridge, Massachusetts 02142

Subject: Rainy Creek Restoration Project

Dear Mr McGuggin,

CDM has reviewed the letter report prepared by Water Consulting Inc (WCI) dated February 27, 2002, prepared on behalf of Mr Parker that you forwarded. We offer the following comments:

Flow rate

- CDM did not evaluate numerous flow rate scenarios for Rainy Creek. Based on speaking with Mr Parker during a site visit, CDM determined that the 48-inch culvert on Mr Parker's property has not been observed flow full even during spring thaws was a conservative assumption.
- In addition, CDM confirmed that this assumption was conservative by contacting Mr Van Swearingen from the Montana Department of Transportation (DOT) to investigate that the likelihood of an overflow condition at the culvert was extremely remote. Mr Swearingen confirmed that there has never been a problem with capacity of the culvert beneath Highway 37, and even during spring runoff periods the 54-inch culvert is not near capacity. The Montana DOT has no plans to upgrade the culvert under Highway 37 as it has never been a problem and does not flow near capacity. The approach on this emergency removal project has been to replace physical features and improvements damaged during the removal of asbestos-containing materials in kind. Since information we obtained indicates that the 48-inch culvert pipe on Mr Parker's property and the 54-inch concrete culvert under Highway 37, we recommended replacing the damaged 48-inch pipe with a new aluminumized coated steel pipe the same diameter, with end flares added. Based on the limited information provided by WCI, CDM cannot evaluate the flow rates presented.

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Precipitation data and run-off area used in their calculations. This information was not included in their report, and their conclusion is contradictory to "local knowledge".

- Also, noteworthy is that WCI's rip-rap calculations recommend Type II rip-rap which is what CDM recommended for the Rainy Creek banks

Channel Geometry

- WCI makes reference to Highway 56. Does WCI mean Highway 377? WCI references a reach of Rainy Creek upstream of Highway 56, no location map was provided to evaluate the appropriateness of a comparison with the reach of Rainy Creek located on Mr. Parker's property. WCI indicates that the "reference reach" displayed similar valley slope and characteristics as the Parker section of Rainy Creek prior to restoration. CDM is unaware of any pre-restoration survey and assessment. We would appreciate receiving a copy of the information that WCI used to evaluate to make this determination.
- WCI should also recognize that it was not the Government's objective to improve Rainy Creek. The objective of the remediation of the Rainy Creek banks was to remove asbestos containing material and restore the Creek to its pre-remediation conditions to the extent practical. The creek bottom was, to the extent possible, not to be disturbed as it had accepted flows without washouts for many many years.

Longitudinal Profile

- WCI makes reference to Highway 56. Does WCI mean Highway 377?
- The slope and creek bed geometry of Rainy Creek were not modified during the emergency removal phase of asbestos remediation work in Libby, except from impacts of vegetation removal. No sediment or other material was to be removed from the creek bottom during this phase of remediation. The Government's direction for the emergency removal that has been completed was to remediate the creek banks only. The creek bed materials would be remediated during a future phase of asbestos remediation project. As such, CDM has not evaluated or designed restoration options for the creek bed. CDM agrees that either rip-rap or other measures will need to be implemented for the Rainy Creek bed if step pools are to be created. CDM expects that the Volpe Center will request this evaluation and design to be performed during 2002.

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- No creek bed remediation or construction was completed during the emergency removal work completed in 2001
- CDM will evaluate energy dissipation alternatives when tasked to do so by the Volpe Center

Rip-Rap Sizing and Installation

- While CDM and WCI used different flow rates in the rip-rap sizing calculation both recommended Montana DOT Type II rip-rap
- 11.2. ■ The rip-rap placed on the south bank of Rainey Creek is undersized and was placed as a temporary measure for the winter shut-down period. Type II rip-rap was not placed because the quarry had stopped blasting operations for the winter and Type II rip-rap was not available at that time.
- ✓ ■ CDM's onsite evaluation of the north bank rip-rap is that it is appropriately sized and has been appropriately placed
- The objective of the bank phase of the remediation was to leave the creek bed undisturbed to the extent practicable. Creek bed remediation has not been addressed in the emergency removal phase of the project. The drawings indicate that the rip-rap be keyed into the creek bed. This will be checked by test pit excavation in Spring 2002

Culvert Capacity and Fish Passage

- The objective of the emergency removal action is to replace physical features and improvements damaged or disturbed during asbestos removals in-kind. A 48-inch culvert was damaged, removed and disposed. A 48-inch culvert was replaced. In addition, based on items discussed above and discussion with the Montana Department of Transportation, there is no justification for a larger culvert to be installed on the Parker property.
- The Volpe Center did not request a fish passage analysis for this phase of the remediation. This type of analysis could potentially be a component of future creek bed evaluation. And if authorized by the Volpe Center constructed
- WCI again makes reference to Highway 56. Does WCI mean Highway 377

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- The Montana DOT has indicated there are no current plans for any modifications to the culvert beneath Highway 37. Any such modification suggestions would have to be presented to the Montana Department of Transportation. If tasked by the Volpe Center CDM will evaluate the need for baffles within the 48-inch culvert on Mr Parker's property although our initial assessment is that baffles within the pipe would restrict flow. The culvert is only 30-feet long. Any energy dissipation devices, if needed, would be better located in the creek bottom.
- CDM has been tasked by the Volpe Center to plan and specify a rigorous revegetation effort to include native shrub and overstory species above the rip-rap. To date the objective has been to protect the lower portions disturbed areas with rip-rap. Originally the Parkers were amenable to selecting the appropriate native species and participating in their planting. CDM has since been tasked by the Volpe Center to develop this restoration plan. WNY?

Water Rights

- WCI makes reference to Highway 56. Does WCI mean Highway 37?
- No drawing or alternative information was available or provided regarding the point of diversion (POD) referenced in WCI's letter report. If WCI or Mr Parker were to provide the dimensions and depth of POD then the Volpe Center could reestablish the POD during the remediation of the creek bed or sooner, if necessary.

If you have any question or would like to discuss this matter further please call me at your convenience.

Very truly yours,

Timothy B Wall
Associate
CDM Federal Programs Corporation

cc Julie Borgeson - Volpe Center
Peter J Borowiec Jr - CDM
Robert D Goltz - CDM
David F Doyle - CDM
Virginia A Roach - CDM

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March 06, 2002

Mr Timothy Wall,
Associate
CDM Federal Programs Corp

Dear Mr Wall,

Mr and Mrs Parker have reviewed the letter response you sent to Mr John McQuiggen
We offer the following comments

In 1996 the culvert that was replaced on our property was running full with a three foot head wall that required deep ditches across the road to prevent a washout

Your comment that "the creek bottom was not to be disturbed as it had accepted flows without washouts for many, many, years" was false In 1996 the entire channel of Rainy Creek from the lower pond above the M-way to the Kootenia river was gutted of its soil, rocks, trees, sections of the county road, and all this material is currently deposited as a "Bar" out into the Kootenia River

Your comment "The slope and creek bed geometry of Rainy Creek were not modified during emergency removal "is ridiculous We had two 25' long bridges across Rainy Creek and now Peter Borowiec is designing the replacement for no less than 40' spans All vegetation including trees, shrubs and their massive root balls were pulled from the channel

Your comment "The creek bed material would be remediated during the future phase of asbestos remediation "I believe that Mr Wall needs to talk to the folks at EPA My wife and I will be getting "Notice of Availability" with no deed restrictions when the restoration work is completed this summer

Your comment "The rip rap placed on the South bank of Rainy Creek is undersized and was placed as a temporary measure for Winter shut-down " is ludicrous The rip rap was first laid on the South side of the creek then the North side and finally the banks of the Kootenia River on the upstream side of the confluence of Rainy Creek You did not put smaller rock on the South side for Winter shutdown At the time of your departure, everything on Rainy Creek was in a "completed" mode

Your comment "CDM's onsite evaluation of the North bank rip rap is that it is appropriately sized and has been appropriately placed "

Yes, Mr Wall, the drawing shows that the rock is to be keyed into the "creek bank If the argument of "drawn to scale" is correct, then we are looking at 15 inches

Now, I am on the understanding that all of these Spring time projects will have been reviewed and a decision made by April 22, 2002 at the multi-faceted meeting in Libby to finalize the total restoration plan before work begins

"LOCAL KNOWLEDGE" as we talk about culvert capacity would seem to be limited to Mel Parker, who has corrected your assumptions and Mr Van Swearingen, who has asked for your phone number

Your comment, "CDM has been tasked by the Volpe Center to plan and specify a rigorous revegetation effort. Originally the Parkers were amenable to selecting the appropriate nature species and participating in their planting." Thank you! Yes we did measure the areas to be revegetated, located the source and availability of the stock. Volpe was notified but unfortunately the vegetation was not secured for a small down payment, so the material went to Idaho. What else can I say, Sir?

Your comment, "No drawing or alternative information was available or provided requiring the point of diversion." Once again, ludicrous! The electrical outlet which runs the pump is on the existing restoration map. The P O D could not be more obvious.

In conclusion Mr Wall I would like to make two comments

We sent the WCI report to you folks on March 01, 2002. I received your reply as did John McQuiggen of Volpe on April 15, 2002. It has been reviewed and back in your hands on the following day.

It is very important to my wife and I that there is expediency in resolving these issues prior to April 22, 2002. Mr Peronard has set this date to have all parties come together on behalf of the final signed restoration plan.

Yes, obviously WCI did mean Hi-way 37# instead of Hi-way 56#. Your continuous reference to this fact throughout the letter degrades your professionalism.

Will this response to your letter make you more aware of its inconsistencies? Hopefully it does not frustrate you to have a group of professionals like WCI suggest that there may very well be valid problems to address on the lower Rainy Creek drainage.

Sincerely,

Mel and Lerah Parker

cc Paul Peronard - EPA
John McQuiggen - Volpe
Julie Borgesi - Volpe

cc Peter Borowiec - CDM
Robert Goltz - CDM
David F Doyle - CDM
Virginia Roach - CDM